

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO. FILING DATE		FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO. 9338	
09/882,697 06/14/2001		Stephen C. Goss	16-12-22-6-5-6-18-11-13		
759	7590 11/26/2004		EXAMINER		
Werner Ulrich			CUMMING, WILLIAM D		
434 Maple Street Glen Ellyn, IL 60137-3826			ART UNIT	PAPER NUMBER	
Sien 2.17 ii, 12 00107 0020			2683		

DATE MAILED: 11/26/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

		Application	No.	Applicant(s)				
Office Action Summary		09/882,697		GOSS ET AL.				
		Examiner		Art Unit				
		Joseph D No		2683				
Period fo	The MAILING DATE of this communicati r Reply	on appears on the c	over sheet with the c	orrespondence ad	ldress			
THE I - Exter after - If the - If NO - Failu Any	ORTENED STATUTORY PERIOD FOR MAILING DATE OF THIS COMMUNICAT sions of time may be available under the provisions of 37 SIX (6) MONTHS from the mailing date of this communicate period for reply specified above is less than thirty (30) day period for reply is specified above, the maximum statutor reto reply within the set or extended period for reply will, be eply received by the Office later than three months after the patent term adjustment. See 37 CFR 1.704(b).	FION. CFR 1.136(a). In no event tion. Is, a reply within the statuto y period will apply and will apply applications.	, however, may a reply be timery minimum of thirty (30) daysexpire SIX (6) MONTHS from ation to become ABANDONE	nely filed s will be considered time the mailing date of this of D (35 U.S.C. § 133).	ly. communication.			
Status								
1)⊠	·							
2a)⊠	This action is FINAL . 2b)⊠ This action is non-final.							
3) 🗌								
	closed in accordance with the practice $\boldsymbol{\iota}$	ınder Ex parte Qua	yle, 1935 C.D. 11, 4:	03 U.G. 213.				
Disposit	ion of Claims							
4)⊠	4) Claim(s) 1-20 is/are pending in the application.							
	4a) Of the above claim(s) is/are withdrawn from consideration.							
5)[5) Claim(s) is/are allowed.							
-	6)⊠ Claim(s) <u>1-20</u> is/are rejected.							
	7) Claim(s) is/are objected to.							
8)∐	Claim(s) are subject to restriction	and/or election rec	danement.					
Applicat	ion Papers							
	The specification is objected to by the E							
10)⊠ The drawing(s) filed on <u>8/05/2004</u> is/are: a)⊠ accepted or b)⊡ objected to by the Examiner.								
	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).							
11)□	Replacement drawing sheet(s) including the The oath or declaration is objected to by							
·			•					
-	under 35 U.S.C. § 119	forcian priority und	or 25 H S C & 110/a)_(d) or (f)				
	Acknowledgment is made of a claim for	toreign priority und	ei 55 U.S.C. 9 119(a)-(u) 01 (1).				
a) ☐ All b) ☐ Some * c) ☐ None of: 1. ☐ Certified copies of the priority documents have been received.								
 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No 								
	3. Copies of the certified copies of t				al Stage			
	application from the International							
* See the attached detailed Office action for a list of the certified copies not received.								
	r							
Attachme	nt(s)		_					
	ce of References Cited (PTO-892)	048)	4) Interview Summary Paper No(s)/Mail D	y (PTO-413) Date				
3) 🔲 Info	ce of Draftsperson's Patent Drawing Review (PTO rmation Disclosure Statement(s) (PTO-1449 or PTO er No(s)/Mail Date		5) Notice of Informal Patent Application (PTO-152) 6) Other:					

Art Unit: 2683

DETAILED ACTION

Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 1-5, 10-15, and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Goss et al. (6,658,255) in view of Friedes et al. (5,311,583).

Regarding claim 1, Goss et al. discloses in a mobile cellular switching network, a method of establishing a cellular call (abstract, fig. 2-3) comprising the steps of:

- a) if a radio traffic channel for a mobile station (MS) caller of said call is available, establishing said call over the available channel (abstract, fig. 2-3);
- b) if no channel is available, permitting the caller to wait while the network waits for a channel to become available (abstract, fig. 2).

However, Goss does not specifically disclose: if no channel is available, permitting the caller to disconnect while the network waits for a channel to become available; and when a channel becomes available for said call, calling back the caller, and establishing the requested call.

Art Unit: 2683

Friedes et al. teaches if no channel is available, permitting the caller to disconnect (terminate) while the network waits for a channel to become available (abstract, fig. 4-6, col. 6 lines 32-67); and when a channel becomes available for said call, calling back the caller, and establishing the requested call (abstract, col. 7 lines 8-9). Therefore, it would have been obvious to one ordinary skilled in the art at the time the invention was made to modify the Goss system with the teaching of Friedes of if no channel is available, permitting the caller to disconnect while the network waits for a channel to become available; and when a channel becomes available for said call, calling back the caller, and establishing the requested call in order to provide the customer with the callback option to make customer happy when the network is congesting so the customer can wait for the available channel without repeating retry.

Regarding claim 2, Goss et al. further discloses the method of claim 1, wherein prior to having said caller disconnect, the system tests to determine whether the expected wait time for an available channel exceeds a first threshold (abstract, fig. 2). However, Goss does not specifically disclose offering call-back service only for those cases in which the expected wait time exceeds said first threshold.

Friedes et al. teaches offering call-back service only for those cases in which the expected wait time exceeds said first threshold (abstract, #409-412 fig. 4). Therefore, it would have been obvious to one ordinary skilled in the art at the time the invention was made to modify the Goss system with the teaching of Friedes of offering call-back service in order to provide the customer with the callback option to make customer

Art Unit: 2683

happy when the network is congesting so the customer can wait for the available channel without repeatedly retry the call.

Regarding claim 3, Friedes et al. further discloses the method of claim 1, further comprising the step of: prior to calling said caller back, testing whether the called party is busy (col. 7 lines 43-45); if the called party is busy, avoiding the attempt to establish a connection to the called party (col. 7 lines 43-56).

Regarding claim 4, Friedes et al. further discloses the method of claim 3, further comprising the step of: returning a busy signal to the calling party (col. 7 lines 43-56).

Regarding claim 5, Goss et al. further discloses The method of claim 1, wherein prior to having said caller disconnect, the system tests to determine whether the expected wait time for an available channel exceeds a first threshold (abstract, fig. 2-3, col. 3 line 46 thru col. 4 line 59); if the expected wait time for an available channel exceeds a first threshold (col. 3 lines 46 thru col. 4 lines 12); offering call-back service to the caller; if the expected wait time does not exceed a first threshold (abstract), the system waits until the lapse of a second threshold smaller than that first threshold (col. 3 lines 46 thru col. 4 lines 12); and if no channel is available after the lapse of the second threshold, offering call-back service to the caller (fig. 2-3, col. 3 lines 46 thru col. 4 lines 12). However, Goss does not specifically disclose offering call-back service only for those cases in which the expected wait time exceeds said first threshold and second threshold.

Art Unit: 2683

Friedes et al. teaches offering call-back service only for those cases in which the expected wait time exceeds said first threshold and second threshold (abstract, #409-412 fig. 4). Therefore, it would have been obvious to one ordinary skilled in the art at the time the invention was made to modify the Goss system with the teaching of Friedes of offering call-back service in order to provide the customer with the callback option to make customer happy when the network is congesting so the customer can wait for the available channel without repeatedly retry the call.

Regarding claim 10, Friedes et al. further discloses the method of claim 1, further comprising the steps of: retaining a call record of said call during the interval between the time that the caller disconnects and a time when the caller is called back; wherein said call record comprises a calling and a called number (#412 fig. 4, col. 6 lines 61-67).

Regarding claim 11, Goss et al. discloses in a mobile cellular switching network, an apparatus for establishing a cellular call (abstract, fig. 2-3) comprising the steps of:

- a) if a radio traffic channel for a mobile station (MS) caller of said call is available, establishing said call over the available channel (abstract, fig. 2-3);
- b) if no channel is available, permitting the caller to wait while the network waits for a channel to become available (abstract, fig. 2).

However, Goss does not specifically disclose: if no channel is available, permitting the caller to disconnect while the network waits for a channel to become available; and when a channel becomes available for said call, calling back the caller, and establishing the requested call.

Art Unit: 2683

Friedes et al. teaches if no channel is available, permitting the caller to disconnect (terminate) while the network waits for a channel to become available (abstract, fig. 4-6, col. 6 lines 32-67); and when a channel becomes available for said call, calling back the caller, and establishing the requested call (abstract, col. 7 lines 8-9). Therefore, it would have been obvious to one ordinary skilled in the art at the time the invention was made to modify the Goss system with the teaching of Friedes of if no channel is available, permitting the caller to disconnect while the network waits for a channel to become available; and when a channel becomes available for said call, calling back the caller, and establishing the requested call in order to provide the customer with the callback option to make customer happy when the network is congesting so the customer can wait for the available channel without repeating retry.

Regarding claim 12, this claim is rejected for the same reason as set forth in claim 2.

Regarding claim 13, this claim is rejected for the same reason as set forth in claim 3.

Regarding claim 14, this claim is rejected for the same reason as set forth in claim 4.

Regarding claim 15, this claim is rejected for the same reason as set forth in claim 5.

Regarding claim 20, this claim is rejected for the same reason as set forth in claim 10.

Art Unit: 2683

3. Claims 6-9, 16-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Goss et al. (6,658,255) in view of Friedes et al. (5,311,583) and further in view of Chow et al (6,654,615).

Regarding claim 6, in the modified Goss et al. system, Goss further discloses the method of claim 1, using a distinctive ringing signal to indicate while waiting for an available traffic channel (col. 3 lines 8-31). However, Goss does not specifically disclose wherein the step of calling back the caller comprises the step of: calling back the caller, using a distinctive ringing signal.

Chow teaches, wherein the step of calling back the caller comprises the step of: calling back the caller, using a distinctive ringing signal (col. 82 lines 57-66). Therefore, it would have been obvious to one ordinary skilled in the art at the time the invention was made to modify the Goss system with the teaching of Chow of calling back using distinctive ring signal in order to indicate the callback from the customer request of service.

Regarding claim 7, Goss et al. further discloses the method of claim 1, wherein the service of calling back the caller (col. 3 lines 46 thru col. 4 lines 12). However Goss et al. does not specifically disclose the call back the caller is offered only to subscribers of that service.

Chow et al. teaches the call back the caller is offered only to subscribers of that service (col. 82 line 48 thru col. 86 line 44). Therefore, it would have been obvious to

Art Unit: 2683

one skilled in the art at the time the invention was made to modify Goss et al. system with the teaching of Chow et al. of call back service in order to free the user from redialing the same busy number or unavailable channel repeatedly.

Regarding claim 8, Chow et al. further discloses the method of claim 7, wherein subscribers of said service are provided with a default treatment, and wherein subscribers of that service can override the default treatment; wherein the default treatment is one of automatic call-back, and no call-back (col. 82 line 48 thru col. 86 line 44). Therefore, it would have been obvious to one skilled in the art at the time the invention was made to modify Goss et al. system with the teaching of Chow et al. of call back service in order to free the user from re-dialing the same busy number or unavailable channel repeatedly.

Regarding claim 9, Goss et al. further discloses the method of claim 1. However, Goss et al. does not specifically disclose wherein if the caller originates a new call while waiting for a call-back, the call-back request is canceled.

Chow et al. teaches if the caller originates a new call while waiting for a call-back, the call-back request is canceled (col. 86 line 31 thru col. 90 line 8). Therefore, it would have been obvious to one skilled in the art at the time the invention was made to modify Goss et al. system with the teaching of Chow et al. of call back service in order to free the user from re-dialing the same busy number or unavailable channel repeatedly.

Regarding claim 16, this claim is rejected for the same reason as set forth in claim 6.

Art Unit: 2683

Regarding claim 17, this claim is rejected for the same reason as set forth in claim 7.

Regarding claim 18, this claim is rejected for the same reason as set forth in claim 8.

Regarding claim 19, this claim is rejected for the same reason as set forth in claim 9.

Response to Arguments

- 4. Applicant's arguments with respect to claims 1-20 have been considered but are moot in view of the new ground(s) of rejection.
- 5. Any response to this action should be mailed to:

Commissioner of Patents and Trademarks

Washington, D.C. 20231

Or faxed to:

703 308-9051, (for formal communication intended for entry)

Or:

(703) 305-9509 (for informal or draft communications, please label "PROPOSED" OR "DRAFT")

Hand-delivered responses should be brought to Crystal Park II, 2121 Crystal Drive, Arlington. VA. Sixth floor (Receptionist).

Art Unit: 2683

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joseph D Nguyen whose telephone number is (703) 605-1301. The examiner can normally be reached on 7:00 AM to 4:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, William Trost can be reached on (703) 308-5318. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9314 for regular communications and (703) 872-9314 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 306-0377.

Joseph Nguyen

Šept. 22, 2004

WILLIAM TRUST
SUPERVISORY PATENT EXAMINER

TECHNOLOGY CENTER 2600